







Mid-South Climate Summary: November 2017

November was warmer and significantly drier than normal across the Mid-South.

TEMPERATURE

Monthly average temperatures for November were between 1.0° and 3.0° warmer than normal for the four climate sites of the region. Jonesboro was the furthest from normal of the four with its monthly average of 52.3°, a 2.7° departure above the November normal. For the year to date Jonesboro is 2.6° warmer than normal. The site, along with Memphis, also recorded the warmest daily high temperature of the four sites with 83.0°. Speaking of Memphis, the site finished the month of November with an average temperature of 54.9°, a 1.7° departure above normal, and remains 2.1° warmer than normal for 2017 to date. Similar to Memphis, Jackson finished November 1.7° warmer than normal with its monthly average temperature of 51.8°. With only one month left in the year, Jackson is currently warmer than normal for 2017 by 2.6°. Additionally, Jackson recorded the coolest daily low temperature of the four sites with 22.0°. Finally, with an average monthly temperature of 54.0°, Tupelo was 1.1° above normal for November, while remaining above normal for the year by 2.2°.

Even though one month remains in 2017, temperatures have been warm enough throughout the year to secure yet another warmer than normal year with 2017. In fact, the year is currently in the top 10 warmest years on record for three of the four official sites: #3 at Jackson, #5 at Memphis, #8 at Tupelo, and #20 at Jonesboro. The final rankings will of course change, dependent on December temperatures.

	Memphis	Jackson	Jonesboro	Tupelo
Average Temperature (Month)	54.9	51.8	52.3	54.0
Normal Avg. Temp (Month)	53.2	50.1	49.6	52.9
Departure from Normal (Month)	1.7	1.7	2.7	1.1
Average Temperature (Year)	66.8	64.1	64.4	66.3
Normal Avg. Temp (Year)	64.7	61.5	61.8	64.1
Departure from Normal (Year)	2.1	2.6	2.6	2.2
Maximum Temperature	83.0	79.0	83.0	81.0
Minimum Temperature	29.0	22.0	26.0	24.0

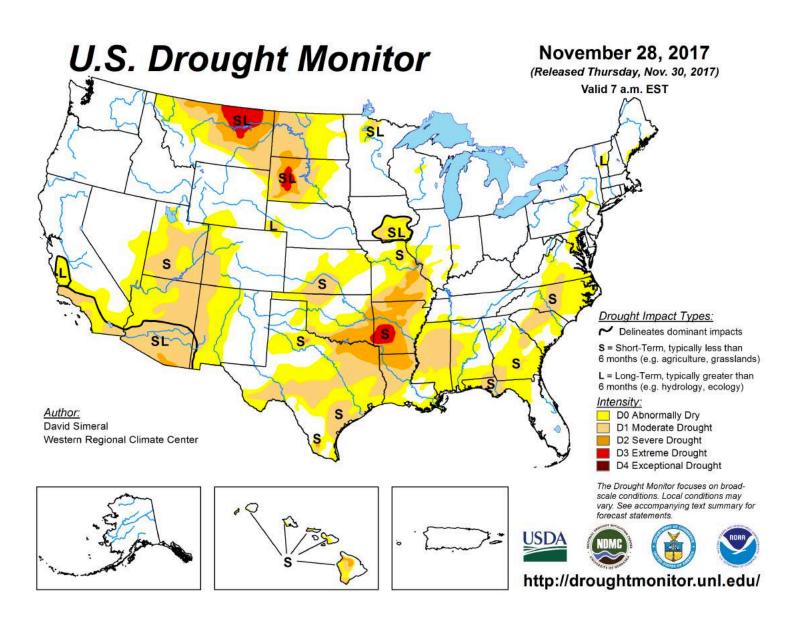


PRECIPITATION

November dryness allowed for drought conditions to creep into the region. These conditions are currently most severe across potions of northeast Arkansas, where the latest release of the U.S. Drought Monitor product classifies up to severe drought conditions existing. Meanwhile, portions of north Mississippi have been so dry they have now been classified in up to moderate drought conditions. The latest edition of the U.S. Drought Monitor can be found on the following page.

Prolonged periods of below normal rainfall have led to these conditions, evident in the November rainfall totals and departures from normal. Jonesboro was the driest site, recording only 1.00" of rain, which made the site 3.90" drier than normal for the month. This meager amount of precipitation received tied the month for the 6th driest month of November on record. However, despite the dry month, Jonesboro remains the site nearest to normal for the year to date, at only 1.28" of precipitation below normal. Tupelo picked up only 1.61" of rain during November, which was 3.09" drier than normal. Like Jonesboro, this was a small enough amount of precipitation to make the 6th driest month of November on record for Tupelo. Further, the site is currently the driest of the four sites for the year, with a departure of 7.37" below normal. 1.81" of rain fell at Memphis during November, 3.68" below normal, while Memphis remains drier than normal for 2017 by 3.82". Finally, Jackson received the most precipitation during the month- albeit it was still dry- with 2.77" of rain, or 2.13" drier than normal. Jackson is currently 4.99" of precipitation below normal for 2017, with only one month remaining in the year.

	Memphis	Jackson	Jonesboro	Tupelo
Total Precipitation (MONTH)	1.81	2.77	1.00	1.61
Normal Precipitation (MONTH)	5.49	4.90	4.90	4.70
Departure from Normal (MONTH)	-3.68	-2.13	-3.90	-3.09
Percent of Normal	33%	57%	20%	34%
Total Precipitation (YEAR)	44.12	42.93	42.05	41.36
Normal Precipitation (YEAR)	47.94	47.92	43.33	48.73
Departure from Normal (YEAR)	-3.82	-4.99	-1.28	-7.37
Percent of Normal (YEAR)	92%	90%	97%	85%



The November 28, 2017 edition of the U.S. Drought Monitor depicts up to severe drought conditions across portions of northeast Arkansas, while up to moderate drought conditions are highlighted across north Mississippi. Additionally, portions of extreme southwest Tennessee have been highlighted in abnormally dry conditions.



Mid-South Climate Summary: Fall 2017

November signaled the end to meteorological fall, which extends from September 1 to November 30. Fall 2017 was mostly warmer than normal for the region, with conditions much drier than normal.

TEMPERATURE

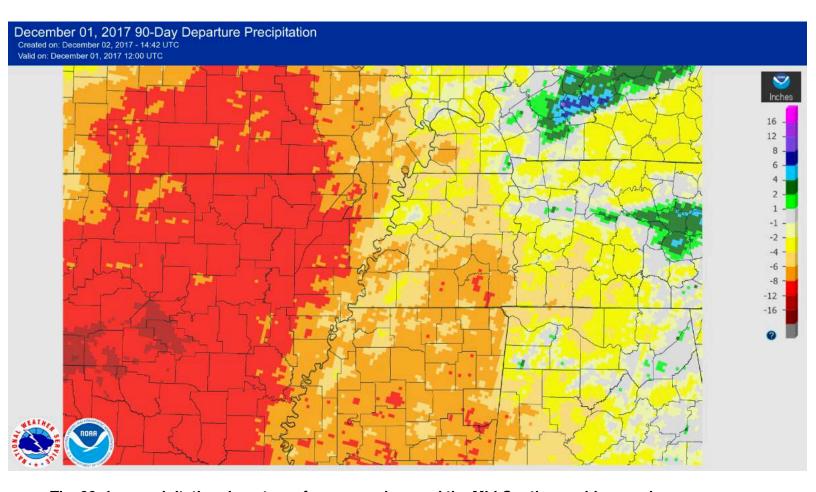
Fall temperatures varied slightly around the region, with some sites near normal and others warmer than normal. Tupelo was closest to normal with its seasonal average of 64.2°, just 0.9° above the seasonal average. Jonesboro had the seasonal average furthest from normal; the seasonal average being 63.4°, resulting in a departure of 2.5° warmer than normal. Memphis' average temperature for Fall 2017 was 65.2°, or 1.0° above normal. Finally, Jackson recorded 61.8° for its seasonal average, or 1.1° above normal.

	Memphis	Jackson	Jonesboro	Tupelo
Average Temperature (Fall 2017)	65.2	61.8	63.4	64.2
Normal Avg. Temp (Fall)	64.2	60.7	60.9	63.3
Departure from Normal (Fall 2017)	1.0	1.1	2.5	0.9

PRECIPITATION

Dry conditions prevailed throughout the season, with some areas now experiencing drought conditions as a result. Jonesboro only recorded 2.43" of rain the entire three month period, which was 9.79" drier than normal. Tupelo picked up 5.31" of rain, which was 6.95" drier than normal. Memphis was 5.10" drier than normal for Fall 2017, recording 7.46" of rainfall, while Jackson's seasonal total of 7.90" was 4.15" drier than normal. The fall season was dry enough to be among the top 10 driest fall seasons at two of the four sites: #4 at Jonesboro, #8 at Tupelo, #16 at Jackson, and #32 at Memphis. A map of the three month departures from normal can be found on the following page.

	Memphis	Jackson	Jonesboro	Tupelo
Total Precipitation (Fall 2017)	7.46	7.90	2.43	5.31
Normal Precipitation (Fall)	12.56	12.05	12.22	12.26
Departure from Normal (Fall 2017)	-5.10	-4.15	-9.79	-6.95

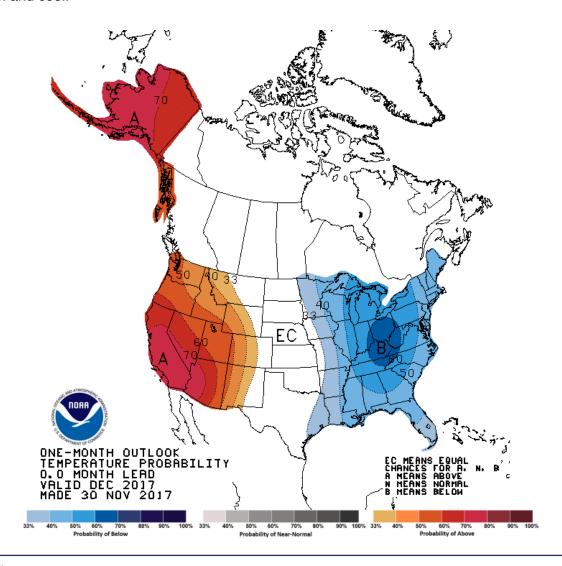


The 90-day precipitation departures from normal around the Mid-South, roughly covering meteorological fall. Eastern Arkansas was the driest portion of the region, with most of the counties there down 8-12" for the fall season. West Tennessee had more varied amounts, with some areas nearer to normal while others were 6-10" drier than normal. Mostly dry conditions dominated across North Mississippi, with most areas at least 6" below normal for the 90-day period covering September to November.

Climate Outlook

TEMPERATURE

Meteorological Winter spans from December 1 to February 28, the coolest season of the year. Temperature trends over much of the year, and in fact the past several years, have generally been warmer than normal. What will this winter hold for the region? For that answer we turn to the Climate Prediction Center (CPC), which predicts trends in climate months and even seasons into the future. The latest one month outlook for the month of December (featured below) highlights the region in enhanced odds of cooler than normal temperatures, which would be a break from the warmer than normal conditions experienced during November. However, the latest three month outlook, which encompasses meteorological winter (December, January, and February collectively), has the region in an area of enhanced odds for warmer than normal temperatures. Much of this forecast is based upon the expected La Nina. La Nina is a phenomenon occurring over the equatorial Pacific Ocean and impacting weather patterns, therefore temperatures and precipitation, over the continental United States. No matter if the forecast is for warmer or cooler than normal conditions, the winter will still have periods of both warm and cool.



PRECIPITATION

With dry conditions prevailing over the region, we are in need of substantial rainfall. Historically, December is one of the wettest months of the year for the region. The latest one month outlook from the CPC highlights the region in an area of equal chances of above, near, or below normal precipitation totals for December. This means there is no clear climate signal at this time to allow for a more definite forecast. What is most troubling about this forecast (featured below) is the area of enhanced odds of drier than normal conditions across portions of central Arkansas. The latest three month precipitation outlook from the CPC, for December through February, highlights northern portions of the region in enhanced odds of wetter than normal conditions, with portions of north Mississippi highlighted in enhanced odds of drier than normal conditions, and the rest of the region highlighted with equal chances of above, near, or below normal precipitation totals.

